Application No. 10/569,834 Dkt. **500.45979X00**Art Unit: 2826 Page 4

## **AMENDMENTS TO THE CLAIMS**

This listing of claims will replace all prior versions, and listings, of claims in the application.

## **Listing of Claims:**

1. (Currently Amended) An electrode substrate in which a lower electrode, an insulating film having lyophobic/lyophilic and lyophilic regions on a surface thereof and an upper electrode are layered sequentially on a substrate, characterized in that:

the lower electrode has a pattern approximately aligned with that of the lyophobic region on the surface of the insulating film;

the upper electrode is formed mainly on the lyophilic region other than the lyophobic region on the surface of the insulating film; and

the upper electrode has a self-aligned pattern in which the pattern of the lower electrode is approximately inversed.

wherein the lower electrode comprises a rectangular shaped gate electrode having a sawtooth-like shape on three of four sides.

2. (Currently Amended) A thin film transistor comprising the electrode substrate according to Claim 1 and a semiconductor film, wherein the electrode substrate is characterized in that a gate electrode is formed as the lower electrode, and a source electrode and a drain electrode are formed as the upper electrode on two or more areas of the lyophilic region separated by the lyophobic region formed on the surface of the insulating film in a pattern approximately aligned with that of the lower electrode so that the upper electrode has, in a self-alignment manner, an approximately inversed pattern of the gate electrode as the lower electrode, the thin film transistor being characterized in that:

the semiconductor film is formed so that the semiconductor film covers and extends across at least a part of each of the following members on said

Application No. 10/569,834 Dkt. **500.45979X00**Art Unit: 2826 Page 5

electrode substrate: the source electrode, drain electrode and the surface of the insulating film (the gate electrode region) interposing therebetween.

- 3. (Currently Amended) An active matrix thin film transistor substrate comprising the electrode substrate according to Claim 1 and thin film transistors, wherein in the electrode substrate, a plurality of gate wirings/electrodes are formed as the lower electrode, and a plurality of signal wirings, a plurality of source/drain electrodes and a plurality of pixel electrodes are formed as the upper electrodes on a plurality of areas of the lyophilic region separated by the lyophobic region formed on the surface of the insulating film in a pattern that is approximately aligned with that of the lower electrode, wherein the semiconductor films of the thin film transistors are formed so that the semiconductor films extend to cover astride at least a part of each of the following members on the electrode substrate: the source electrodes, drain electrodes and lyophobic regions (gate wiring/electrode regions), on the surface of the insulating film, interposing between the source electrodes and the drain electrodes, and wherein the thin film transistors are each disposed at any one of the intersection portions between the gate wiring and signal wiring.
- 4. (Currently Amended) The active matrix thin film transistor substrate, according to Claim 3, characterized in that:

a plurality of gate wirings/electrodes are formed adjacently to each other as the lower electrodes, wherein the gate wirings/electrodes are characterized by having a shape in which a plurality of adjacently disposed ring-shaped rectangles having ring-shaped openings each having an opening are connected to each other at least at one or more locations;

signal wirings and source/drain electrodes are continuously formed as the upper electrodes in a self-alignment manner in the spaces between said rectangles so as to extend across the connection parts between said rectangles; and

Application No. 10/569,834 Dkt. 500.45979X00

Art Unit: 2826 Page 6

the pixel electrodes each are formed in one of the ring-shaped openings of said rectangles.

- 5. (Currently Amended) The active matrix thin film transistor substrate, according to Claim 4, characterized in that the widths of the connection parts connecting the plurality of rectangles, forming individual gate wirings/electrodes, each having one of the openings and the widths of the spaces between the plurality of gate wirings/electrodes are smaller than the-separations between the plurality of rectangles each having one of the openings forming said individual gate wirings/electrodes.
- 6. (Original) A liquid crystal, electrophoresis, or organic electroluminescence display device, characterized by using the thin film transistor substrate according to any one of Claims 3 to 5 as an active matrix switch.
- 7. (Currently Amended) An RFID device Radio Frequency Identification Device (RFID), characterized by using the thin film transistor according to Claim 2 as at least a part thereof.
- 8. (Original) The electrode substrate, thin film transistor and active matrix thin film transistor substrate, according to Claims 1 to 3, characterized by using a photosensitive lyophobic monolayer film comprising a carbon chain in which at least a part thereof is terminated with a fluorine or hydrogen atom as a photosensitive lyophobic film.

Claims 9 and 10 (Canceled).

Application No. 10/569,834

Art Unit: 2826

Dkt. 500.45979X00

Page 7

11. (Currently Amended) The electrode substrate, thin film transistor, and active matrix thin film transistor substrate according to Claims 1 to 5, characterized in that the lyophobic region is photosensitive and at least one of the substrate and the insulating film is formed with a material that does not transmit a light having a photosensitive wavelength of the photosensitive lyophobic film region.

12. (New) The electrode substrate according to claim 1, wherein a semiconductor film is formed on a fourth side of the rectangularly shaped gate electrode which does not have a sawtooth-like shape.